



Air Pollution Control Board  
Brian P. Bilbray District 1  
Dianne Jacob District 2  
Pamela Slater District 3  
Leon L. Williams District 4  
John MacDonald District 5

Air Pollution Control Officer  
R. J. Sommerville

August 23, 1994

## COMPLIANCE ADVISORY

### Notice of Amendments to New Source Review Rules 20.1 through 20.4, Circumvention Rule 60 and New Rules 20.9 and 20.10

On May 17, 1994, the San Diego County Air Pollution Control Board adopted amendments to New Source Review (NSR) Rules 20.1 through 20.4, Circumvention Rule 60 and added new Rules 20.9 and 20.10.

**Who does New Source Review affect?** The amendments apply to all new, modified or portable equipment permitted by the San Diego County Air Pollution Control District.

**Why were the changes made?** The federal and state Clean Air Acts mandate the District to mitigate the impact of new air emissions through emission offsets, control technology requirements and air quality impact assessments.

#### **BACKGROUND** **State Clean Air Act**

San Diego County is classified by the state Air Resources Board as a serious region for ozone (photochemical smog) and is a non-attainment area for inhalable particulates. That's why the California Clean Air Act specifies requirements for stationary sources of:

- volatile organic compounds (VOCs)
- oxides of nitrogen (NO<sub>x</sub>)
- oxides of sulfur (SO<sub>x</sub>)
- particulate matter smaller than 10 microns (PM<sub>10</sub>)
- carbon monoxide (CO).

#### **STATE REQUIREMENTS**

As mandated by the California Clean Air Act, the revised NSR rules require applicants to:

**BACT for 10 or more pounds per day**

- 1) Use Best Available Control Technology (BACT) on new or modified equipment with the potential to emit 10 or more pounds per day of any single pollutant.

**1:1 emission offsets for 15 or more tons per year**

- 2) Provide emission offsets at a 1.0 to 1.0 ratio for emission increases at new or modified stationary sources with the potential to emit 15 or more tons per year of that pollutant.

**BACKGROUND**  
**Federal Clean Air Act**

Because San Diego County is classified by the Environmental Protection Agency as a severe region for ozone and a non-attainment area for carbon monoxide, the federal Clean Air Act has also strengthened requirements for new or modified stationary sources.

**FEDERAL**  
**REQUIREMENTS**

Accordingly, the NSR rules require the following of stationary sources with the potential to emit 25 or more tons of VOC or NOx per year:

**LAER on new or modified equipment**

- 1) Use Lowest Achievable Emission Rate (LAER) control technology on new or modified equipment increasing NOx or VOC emissions.

**1.3 to 1.0 emission offsets**

- 2) Provide emission offsets at a ratio of 1.3 to 1.0 for NOx and VOC emission increases. For example, each 100 pounds in increased emissions would require an offset of 130 pounds in reduced emissions.

**Threshold based upon total 5-year emissions**

- 3) A stationary source may apply a five-year emissions accounting method before installing LAER or providing federal offsets. However, the state thresholds for BACT and offset requirements still apply.

**Choice of BACT instead of LAER**

- 4) A stationary source may install BACT instead of LAER to mitigate emission increases if the source:
  - provides on site offsets for VOC or NOx at a 1.3 to 1 ratio
  - or
  - has the potential to emit less than 100 tons per year of VOC or NOx.

## **PSD requirements**

- 5) As mandated by federal law, the revised NSR rules specify Prevention of Significant Deterioration (PSD) provisions to assess a project's impact upon air quality, soils and vegetation, growth and visibility impairment.

PSD provisions apply to:

- 28 stationary source categories with the potential to emit 100 or more tons per year of PM<sub>10</sub>, SO<sub>x</sub> or NO<sub>x</sub>,
- all other stationary sources with the potential to emit 250 or more tons per year of PM<sub>10</sub>, SO<sub>x</sub> or NO<sub>x</sub> and
- new and modified sources with the potential to cause significant air quality impacts in Class I areas,

(Note: The Agua Tibia Wilderness Area is the only area in San Diego County designated as Class I by the EPA.)

## **AQIA provisions**

- 6) The revised NSR rules also require an air quality impact analysis (AQIA) of certain emission increases. AQIA provisions apply on a project basis, depending on the project's hourly or daily emission potential.

## **KEY CHANGES TO THE NSR RULES**

### **Lower BACT threshold, new emission basis**

The amended rules require BACT for new or modified equipment with the potential to emit 10 or more pounds per day of VOC, NO<sub>x</sub>, SO<sub>x</sub>, PM<sub>10</sub> or CO.

Previously, BACT was required for equipment at stationary sources with the potential to emit 100 or more pounds per day of VOC, NO<sub>x</sub>, SO<sub>x</sub>, or PM<sub>10</sub>, or 550 pounds per day of CO.

Also, the previous BACT threshold was based upon total emission changes from all modifications occurring at a site since 1979. The new BACT threshold is based upon emissions from individual projects.

**Lower LAER threshold** LAER is required for new or modified equipment which increases VOC or NOx emissions at a stationary source already emitting 25 or more tons per year of VOC or NOx. Previously, the threshold was 40 tons per year.

**Choice of threshold basis for LAER, offsets** The previous LAER threshold was based upon total emission changes from all modifications at the site in the past five years.

Now the applicant may choose to have its LAER and federal offset requirements based upon:

- emissions from individual projects currently under review
- or
- total emission changes from all modifications at the site in the past five years.

**Redefined AQIA threshold** Previously, the threshold to determine which stationary sources must conduct an air quality impact analysis was based upon total emissions in the past five years. Now the threshold is based upon emissions from individual projects.

**Additional AQIA changes** The amended NSR rules also change these AQIA provisions:

- 1) Eliminate the hourly threshold for PM<sub>10</sub>.
- 2) Eliminate the yearly threshold for PM<sub>10</sub>, NOx, SOx, CO and lead.
- 3) Redefine the basis for particulate impacts from total particulate matter to PM<sub>10</sub>.
- 4) Reduce the daily emission threshold from 250 pounds of total particulate matter (about 125 pounds of PM<sub>10</sub>) to 100 pounds of PM<sub>10</sub>.

**Guidelines for BACT** Because the new emission threshold for BACT is significantly lower, more facilities will be required to conduct a BACT analysis.

The District is currently developing guidelines explaining how to conduct a BACT analysis and to which facilities the requirements apply. The document should be available in August.

**What if San Diego County is reclassified?**

If the air basin is reclassified by the federal government from severe to serious for ozone:

- the threshold for LAER and offsets will increase from 25 to 50 tons of VOC or NOx emissions per year, and
- the offset ratio will be 1.2 to 1.0 instead of 1.3 to 1.0.

**Offset criteria**

Emission offsets must:

- be permanent
- be quantifiable
- not be replaced by increases elsewhere in the air basin and
- not be required by other District rules.

**Expanded definition of circumvention**

The Board also adopted changes to Rule 60. These changes redefine circumvention to preclude the creation of business or financial arrangements intended to evade New Source Review requirements.

**Summary of NSR Rule Changes**

Rule components	New threshold	Previous threshold
BACT	10 pounds per day/project	100 pounds per day/source*
LAER	25 tons per year/source	40 tons per year/source
Emission offsets	state: 15 tons/year at 1 to 1	40 tons per year at 1.2 to 1
	federal: 25 tons /year at 1.3 to 1	
AQIA	by project	by stationary source
PSD	250 tons per year/source	100 tons per year/source

**For copies of the rules**

Contact the District's Clerical Division at (619) 694-3307.

**For more information**

Contact the District's Engineering Division at (619) 694-3307.

\*source = stationary source